

OIPE

RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/818,918

DATE: 04/18/2001

TIME: 16:43:45

Input Set : A:\Seqlist.txt

Output Set: N:\CRF3\04182001\I818918.raw

ENTERED

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4 <110> APPLICANT: Krieg, Arthur M.
5       Kline, Joel N.
6       Klinman, Dennis
7       Steinberg, Alfred D.
9 <120> TITLE OF INVENTION: Immunostimulatory Nucleic Acid Molecules
12 <130> FILE REFERENCE: C1039/7048 (AWS)
C--> 14 <140> CURRENT APPLICATION NUMBER: US/09/818,918
C--> 14 <141> CURRENT FILING DATE: 2001-03-27
14 <150> PRIOR APPLICATION NUMBER: US 08/276,358
15 <151> PRIOR FILING DATE: 1994-07-15
17 <150> PRIOR APPLICATION NUMBER: US 08/386,063
18 <151> PRIOR FILING DATE: 1995-02-07
20 <150> PRIOR APPLICATION NUMBER: US 08/738,652
21 <151> PRIOR FILING DATE: 1996-10-30
23 <160> NUMBER OF SEQ ID NOS: 56
25 <170> SOFTWARE: FastSEQ for Windows Version 3.0
27 <210> SEQ ID NO: 1
28 <211> LENGTH: 20
29 <212> TYPE: DNA
30 <213> ORGANISM: Artificial Sequence
32 <220> FEATURE:
33 <223> OTHER INFORMATION: Synthetic oligonucleotide
35 <400> SEQUENCE: 1
36 atggaagggtc cagtgttctc----- 20
38 <210> SEQ ID NO: 2
39 <211> LENGTH: 20
40 <212> TYPE: DNA
41 <213> ORGANISM: Artificial Sequence
43 <220> FEATURE:
44 <223> OTHER INFORMATION: Synthetic oligonucleotide
46 <400> SEQUENCE: 2
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50 <211> LENGTH: 20
51 <212> TYPE: DNA
52 <213> ORGANISM: Artificial Sequence
54 <220> FEATURE:
55 <223> OTHER INFORMATION: Synthetic oligonucleotide
57 <400> SEQUENCE: 3
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60 <210> SEQ ID NO: 4
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62 <212> TYPE: DNA
63 <213> ORGANISM: Artificial Sequence
65 <220> FEATURE:
66 <223> OTHER INFORMATION: Synthetic oligonucleotide
68 <400> SEQUENCE: 4

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69	gctagatggtt agcgt	
71	<210> SEQ ID NO: 5	15
72	<211> LENGTH: 19	
73	<212> TYPE: DNA	
74	<213> ORGANISM: Artificial Sequence	
76	<220> FEATURE:	
77	<223> OTHER INFORMATION: Synthetic oligonucleotide	
79	<400> SEQUENCE: 5	
80	gagaacgtcg accttcgat	
82	<210> SEQ ID NO: 6	19
83	<211> LENGTH: 15	
84	<212> TYPE: DNA	
85	<213> ORGANISM: Artificial Sequence	
87	<220> FEATURE:	
88	<223> OTHER INFORMATION: Synthetic oligonucleotide	
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91	gcatgacgtt gagct	
93	<210> SEQ ID NO: 7	15
94	<211> LENGTH: 20	
95	<212> TYPE: DNA	
96	<213> ORGANISM: Artificial Sequence	
98	<220> FEATURE:	
99	<223> OTHER INFORMATION: Synthetic oligonucleotide	
101	<400> SEQUENCE: 7	
102	tccatgacgt tcctgatgct	
104	<210> SEQ ID NO: 8	20
105	<211> LENGTH: 20	
106	<212> TYPE: DNA	
107	<213> ORGANISM: Artificial Sequence	
109	<220> FEATURE:	
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112	<400> SEQUENCE: 8	
113	tccatgagct tcctgagtct	
115	<210> SEQ ID NO: 9	20
116	<211> LENGTH: 20	
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118	<213> ORGANISM: Artificial Sequence	
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121	<223> OTHER INFORMATION: Synthetic oligonucleotide	
123	<400> SEQUENCE: 9	
124	tccaagacgt tcctgatgct	
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129	<213> ORGANISM: Artificial Sequence	
131	<220> FEATURE:	
132	<223> OTHER INFORMATION: Synthetic oligonucleotide	
134	<400> SEQUENCE: 10	
135	tccatgacgt tcctgacgtt	20

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137 <210> SEQ ID NO: 11
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139 <212> TYPE: DNA
140 <213> ORGANISM: Artificial Sequence
142 <220> FEATURE:
143 <223> OTHER INFORMATION: Synthetic oligonucleotide
145 <400> SEQUENCE: 11
146 tccatgagct tcctgagtgc t
148 <210> SEQ ID NO: 12
149 <211> LENGTH: 20
150 <212> TYPE: DNA
151 <213> ORGANISM: Artificial Sequence
153 <220> FEATURE:
154 <223> OTHER INFORMATION: Synthetic oligonucleotide
156 <400> SEQUENCE: 12
157 ggggtcaacg ttgagggggg
159 <210> SEQ ID NO: 13
160 <211> LENGTH: 15
161 <212> TYPE: DNA
162 <213> ORGANISM: Artificial Sequence
164 <220> FEATURE:
165 <223> OTHER INFORMATION: Synthetic oligonucleotide
167 <400> SEQUENCE: 13
168 gctagacgtt agcgt
170 <210> SEQ ID NO: 14
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172 <212> TYPE: DNA
173 <213> ORGANISM: Artificial Sequence
175 <220> FEATURE:
176 <223> OTHER INFORMATION: Synthetic oligonucleotide
178 <221> NAME/KEY: modified_base
179 <222> LOCATION: (7)...(7)
180 <223> OTHER INFORMATION: m5c
182 <400> SEQUENCE: 14
183 gctagacgtt agcgt
185 <210> SEQ ID NO: 15
186 <211> LENGTH: 15
187 <212> TYPE: DNA
188 <213> ORGANISM: Artificial Sequence
190 <220> FEATURE:
191 <223> OTHER INFORMATION: Synthetic oligonucleotide
193 <221> NAME/KEY: modified_base
194 <222> LOCATION: (7)...(7)
195 <223> OTHER INFORMATION: m5c
197 <221> NAME/KEY: modified_base
198 <222> LOCATION: (13)...(13)
199 <223> OTHER INFORMATION: m5c
201 <400> SEQUENCE: 15
202 gctagacgtt agcgt

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204 <210> SEQ ID NO: 16
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206 <212> TYPE: DNA
207 <213> ORGANISM: Artificial Sequence
209 <220> FEATURE:
210 <223> OTHER INFORMATION: Synthetic oligonucleotide
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215 <210> SEQ ID NO: 17
216 <211> LENGTH: 20
217 <212> TYPE: DNA
218 <213> ORGANISM: Artificial Sequence
220 <220> FEATURE:
221 <223> OTHER INFORMATION: Synthetic oligonucleotide
223 <400> SEQUENCE: 17
224   atggaaggct cagcgttctc
226 <210> SEQ ID NO: 18
227 <211> LENGTH: 20
228 <212> TYPE: DNA
229 <213> ORGANISM: Artificial Sequence
231 <220> FEATURE:
232 <223> OTHER INFORMATION: Synthetic oligonucleotide
234 <400> SEQUENCE: 18
235   atcgactctc gagcgttctc
237 <210> SEQ ID NO: 19
238 <211> LENGTH: 20
239 <212> TYPE: DNA
240 <213> ORGANISM: Artificial Sequence
242 <220> FEATURE:
243 <223> OTHER INFORMATION: Synthetic oligonucleotide
245 <221> NAME/KEY: modified_base
246 <222> LOCATION: (3)...(3) ✓
247 <223> OTHER INFORMATION: m5c
249 <221> NAME/KEY: modified_base
250 <222> LOCATION: (10)...(10) ✓
251 <223> OTHER INFORMATION: m5c
253 <221> NAME/KEY: modified_base
254 <222> LOCATION: (14)...(14), ✓
255 <223> OTHER INFORMATION: m5c
257 <400> SEQUENCE: 19
258   atcgactctc gagcgttctc
260 <210> SEQ ID NO: 20
261 <211> LENGTH: 20
262 <212> TYPE: DNA
263 <213> ORGANISM: Artificial Sequence
265 <220> FEATURE:
266 <223> OTHER INFORMATION: Synthetic oligonucleotide
268 <221> NAME/KEY: modified_base
269 <222> LOCATION: (3)...(3)

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270 <223> OTHER INFORMATION: m5c
272 <400> SEQUENCE: 20
273 atcgactctc gagcgttctc
275 <210> SEQ ID NO: 21 20
276 <211> LENGTH: 20
277 <212> TYPE: DNA
278 <213> ORGANISM: Artificial Sequence
280 <220> FEATURE:
281 <223> OTHER INFORMATION: Synthetic oligonucleotide
283 <221> NAME/KEY: modified_base
284 <222> LOCATION: (18)...(18)
285 <223> OTHER INFORMATION: m5c
287 <400> SEQUENCE: 21
288 atcgactctc gagcgttctc
290 <210> SEQ ID NO: 22 20
291 <211> LENGTH: 20
292 <212> TYPE: DNA
293 <213> ORGANISM: Artificial Sequence
295 <220> FEATURE:
296 <223> OTHER INFORMATION: Synthetic oligonucleotide
298 <400> SEQUENCE: 22
299 atggaaggtc caacgttctc
301 <210> SEQ ID NO: 23 20
302 <211> LENGTH: 20
303 <212> TYPE: DNA
304 <213> ORGANISM: Artificial Sequence
306 <220> FEATURE:
307 <223> OTHER INFORMATION: Synthetic oligonucleotide
309 <400> SEQUENCE: 23
310 gagaacgctg gaccttccat
312 <210> SEQ ID NO: 24 20
313 <211> LENGTH: 20
314 <212> TYPE: DNA
315 <213> ORGANISM: Artificial Sequence
317 <220> FEATURE:
318 <223> OTHER INFORMATION: Synthetic oligonucleotide
320 <400> SEQUENCE: 24
321 gagaacgctc gaccttccat
323 <210> SEQ ID NO: 25 20
324 <211> LENGTH: 20
325 <212> TYPE: DNA
326 <213> ORGANISM: Artificial Sequence
328 <220> FEATURE:
329 <223> OTHER INFORMATION: Synthetic oligonucleotide
331 <400> SEQUENCE: 25
332 gagaacgctc gaccttcgat
334 <210> SEQ ID NO: 26 20
335 <211> LENGTH: 20
336 <212> TYPE: DNA

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VERIFICATION SUMMARY

PATENT APPLICATION: US/09/818,918

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Input Set : A:\Seqlist.txt

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L:14 M:270 C: Current Application Number differs, Replaced Current Application No

L:14 M:271 C: Current Filing Date differs, Replaced Current Filing Date